

LOS CARNEROS WATER DISTRICT

OVERVIEW

Established in 1978, the Los Carneros Water District (LCWD) was formed to provide reclaimed water to a southwest portion of Napa County known as “Carneros.” The District’s formation was purposely sought by local landowners to facilitate an agreement with the Napa Sanitation District (NSD) for the planning, construction, and operation of projects necessary for the delivery of reclaimed water for agricultural use. Although various proposed reclamation projects were considered over the next 25 years, none were implemented. As a result, the District has remained dormant with no immediate plans to initiate operations or services.

LCWD’s formation followed several years of local efforts with respect to identifying suitable water supply alternatives to creek diversions and groundwater withdraws. In 1976, a group of landowners organized the “Carneros Area Water Committee” and petitioned the Napa County Board of Supervisors to authorize a study evaluating potential agricultural water supply projects for the Carneros area. The study was conducted by the Napa County Flood Control and Water Conservation District and examined irrigation requirements for the Carneros area relating to topography, soil, and climate conditions. Noting that the predominant land use within Carneros was devoted to dry farming, and to a lesser extent vineyards and orchards, the study concluded that the approximately 7,000-acre area would be best served with treated wastewater from an advanced wastewater facility that was under construction by NSD.¹ Following the release of the study, meetings were convened between the Carneros Area Water Committee and NSD to discuss possible supply arrangements involving reclaimed water. NSD agreed to negotiate a reclaimed water supply agreement once the landowners formed a public agency capable of executing a contract agreement.

In 1977, following several public meetings with the Carneros Area Water Committee, LAFCO approved the proposal to form LCWD under the California Water District Act.² Notably, LAFCO conditioned its approval by requiring the District to voluntarily dissolve if an agreement was not reached with NSD for the delivery of no less than 2,000 acre-feet of reclaimed water by January 1, 1980. In 1983, after receiving a deadline extension by LAFCO, the District reached a 40-year agreement with NSD providing it the right to obtain up to 2,000 acre-feet of secondary (restricted) treated wastewater annually for agricultural use. The District agreed to be responsible for the design, planning, financing,

¹ The study projected costs for a conveyance and distribution system using two planning alternatives: minimum and maximum service requirements. The minimum service system, which included a reduced service area encompassing low-lying lands and excluded storage facilities, was projected to cost approximately \$1,750,000. A maximum service system, which included service to all parcels within the region and storage facilities, was projected to cost approximately \$7,350,000. Comparatively, the maximum system provided the Carneros area with greater planning flexibility, including the ability to accommodate potential changes in land use patterns by alternating between secondary and tertiary treated wastewater.

² Landowners voted to approve the formation of LCWD on March 7, 1978.

and construction of all improvements necessary to convey and distribute reclaimed water from NSD's Soscol Wastewater Treatment Plant to the District. In exchange for taking reclaimed water, the District would receive an annual payment from NSD. This payment would be equal to the amount in savings incurred by NSD for not having to expend on additional storage and treatment for the treated wastewater used by the District for each calendar year. NSD agreed to manage its wastewater facilities in order that 2,000 acre-feet of reclaimed water would remain available to the District. Water quality would be consistent with standards established by federal, state, and local authorities. The agreement included a timetable allowing NSD the right to contract with others for the amount and/or portion of reclaimed water entitled to LCWD in the event the District was not utilizing its entitlement by January 1, 1989.

In response to NSD's requirement that LCWD utilize its allocation of reclaimed water by January 1, 1989 or risk the loss of entitlement, LAFCO issued its own timetable for the District. LAFCO required that the District dissolve unless a conveyance and distribution system was in place by the aforementioned date. By 1989, the District completed design plans for a distribution and conveyance system as well as secured required permits with the San Francisco Bay – Regional Water Quality Control Board. After receiving an extension from LAFCO to pursue financing, the District secured a low-interest loan from the State of California to begin construction on its reclamation project. Implementation of the District's reclamation project, however, was suspended due to design and oversight concerns expressed by NSD.

Beginning in the early 1980s, much of the agricultural land in the Carneros region became vineyards, prompting a change in water quality requirements within LCWD. Rather than requiring only secondary treated wastewater for irrigating dry farming crops, the influx of vineyards prompted the District to procure tertiary (unrestricted) treated wastewater to meet stricter federal and state water quality requirements.³ In order to produce tertiary treated wastewater, NSD would incur additional treatment expenses not covered under the 1983 agreement with the District. To assess interest in unrestricted reclaimed water in the Carneros area, NSD convened several meetings with local landowners. Following a strong show of support by landowners and the approval of a working group formed by LCWD, the District and NSD reached agreement on a new reclaimed water supply contract in 1995. This agreement terminated the terms and conditions of the 1983 agreement and transferred the responsibility for the planning, financing, construction, operation, and maintenance of a reclaimed water distribution system to NSD. The distribution system, referred to as the "Carneros Recycled Water Service Project," was planned to include a network of 18-inch to 36-inch pipelines conveying unrestricted treated wastewater from the Soscol Wastewater Treatment Plant to Carneros. The project proposed constructing a pipeline underlaying the Napa River, through the Stanly Ranch area, and along county roads and easements until entering into the District's service area. NSD's willingness to execute the agreement with the District, however, was predicated on reaching agreements with individual landowners. NSD

³ Title 22 of the California Code of Regulations prohibits the use of secondary treated recycled water on food crops that involves contact with the edible portion of the crop; tertiary treated wastewater is permissible.

wanted assurances that there were a sufficient number of committed users before commencing on a project anticipated to cost approximately \$3,500,000. During the course of the negotiations, three prominent landowners raised concerns regarding the potential for negative public reaction to the use of reclaimed wastewater on vineyards. These property owners wanted the ability to terminate their agreements with NSD for reclaimed water at their discretion. At the same time, other landowners in the District wavered on the need for reclaimed water service. When the District was formed, California was a year removed from a drought that severely taxed local water supplies. By the 1990s, many landowners were less concerned with existing and future water supplies as they were 15 years earlier. Unwilling to meet the conditions of the landowners seeking exit clauses, NSD suspended implementing the contract and applied the money earmarked for the Carneros Recycled Water Service Project to finance other reclamation projects. The 1995 agreement between both agencies remains in effect until mutually terminated or upon written notice by NSD that it no longer intends to implement its planned reclamation project.

GOVERNANCE

LCWD was organized under the California Water District Law, Division 13 of the California Water Code. The District's governing body is comprised of an elected five-member board of directors who serve staggered four-year terms. In order to serve, a board member must be a landowner, legal representative, or a designated representative of land within the District. Elections are based on the landowner-voter system allowing each landowner one vote for each dollar that his or her property is assessed (based on last assessment roll). In addition to electing a president, the board is required to appoint a secretary whose responsibilities include keeping records of all board proceedings. Services can be financed through water use and standby charges, assessments, the lease or sale of surplus water, and general obligation and revenue bonds.

LCWD is currently without a fifth director due to a vacated term. The District has not conducted a board meeting for several years. Board members have met on an infrequent basis to discuss specific inquiries involving the District, including most recently meeting with LAFCO staff. The District does not maintain an office or a phone line dedicated to District activities. Meetings have taken place in the past at the Los Carneros elementary school and the homes of board members. Pursuant to the California Water District Law (Water Code 34000 et. seq.), the District is authorized to provide the following municipal services:

- The production, storage, and distribution of water for irrigation, domestic, industrial, and municipal purposes and/or any associated reclamation works (WC §35401)
- The acquisition, construction, and operation of facilities for the collection, treatment, and disposal of sewage, waste, and storm water (WC §35550)

- The construction, operation, and/or maintenance of facilities for the generation of hydroelectric power (WC §35570)

LCWD has never provided these services.

OPERATIONS

LCWD does not provide services or operations.

ADOPTED BOUNDARIES

LCWD's adopted service area is comprised of a contiguous, unincorporated area consisting of approximately 5,772 acres. The District's adopted sphere of influence encompasses the majority of its jurisdictional boundary with one notable exception: land located north of State Highway 12. The District is under the land use authority of the County of Napa. Land located within the District's adopted sphere of influence is designated under the County's General Plan as "Agriculture Watershed and Open Space" and "Agricultural Resource." Zoning for this area is comprised of two standards: "Agricultural Watershed" and "Agricultural Watershed – Airport Compatibility." Both zoning standards require minimum parcel sizes of 160 acres.⁴

LCWD – Adopted Boundaries	
District Boundary:	5,772 acres *
Sphere of Influence Boundary:	5,614 acres *

- * Figures are approximations calculated using information generated by LAFCO and County of Napa's geographic information systems.

WATER SUPPLY

LCWD does not own, contract, or maintain rights to water supplies. Water supplies for agricultural and domestic uses by landowners within the District are primarily satisfied through creek diversions and groundwater withdraws. Creek diversions are drawn from two tributaries of the Napa River: Carneros Creek and Huichica Creek, while groundwater is pumped from the Carneros Valley Basin. Due to increasing demands, environmental restrictions, and concerns involving overdraft, both water sources (surface and groundwater) are considered inadequate to sustain long-term agricultural demands within the District.

⁴ District land located outside of its sphere of influence is also zoned Agricultural Watershed.

WATER DEMAND

LCWD estimates current reclaimed water demand within the District is between 1,000 and 2,000 acre-feet per year.

WATER TREATMENT FACILITIES

LCWD does not own, lease, or operate treatment facilities.

DISTRIBUTION SYSTEM AND STORAGE FACILITIES

LCWD does not own, lease, or operate distribution systems or storage facilities.

RATE SCHEDULE

LCWD does not have an adopted rate schedule.⁵

FINANCIAL

LCWD does not have an adopted budget for 2002-2003. Although it is empowered under the California Water Code to generate revenue through assessments, bonds, and water use and standby charges, the District currently remains without revenue, expenses, or a reserve fund.

WRITTEN DETERMINATIONS

In anticipation of reviewing and updating Los Carneros Water District's sphere of influence, and based on the above-mentioned information, the following written determinations are intended to fulfill the requirements of Government Code §56430. When warranted, some determinations include supplemental information listed in italics to provide context to the underlying service factor. A review of the District's sphere of influence will be included as part of a future study.

⁵ Under its agreement with the Napa Sanitation District (NSD), the District conveys all rights and powers with respect to establishing reclaimed water rates within its jurisdictional boundary conveys. As of January 2003, NSD's rate schedule for reclaimed water service is \$0.77 per 1,000 gallons.

Infrastructure Needs or Deficiencies:

1. The Los Carneros Water District was formed in 1978 for the purpose of facilitating an agreement with the Napa Sanitation District for the delivery of reclaimed water for agricultural use. Although various proposed reclamation projects were considered over the next 25 years, none were implemented. As a result, the District remains dormant with no infrastructure or facilities relating to the provision of reclaimed water service.
2. Existing water supplies within the Los Carneros Water District's jurisdictional boundary are satisfied through creek diversions from Carneros and Huichica Creeks and groundwater withdraws from the Carneros Valley Basin. These supplies are inadequate to sustain long-term agricultural demands within the District.
3. Due to increased demands and stronger environmental standards within their watersheds, Carneros and Huichica Creeks may be placed on the State Water Resources Control Board's list of fully appropriated stream systems, enhancing the need for an alternative water supply for landowners within the Los Carneros Water District.

California Water Code Section §1026 specifies that once a stream system has been designated as fully appropriated, the State Water Resources Control Board can no longer accept applications to appropriate water, and may cancel all pending applications. Average time to process an application is five to seven years.

4. There is limited information relating to the availability of groundwater within Los Carneros Water District's jurisdictional boundary. The District should work with the Napa County Resource Conservation District to begin evaluating groundwater capacities and enhancement opportunities in the Carneros area.

Property owners report that the local groundwater basin (Carneros Valley Basin) is vulnerable to overdraft as a result of declining water levels and is susceptible to saltwater intrusion due to the close proximity of the Napa River.

5. In the event of a drought, existing water supply constraints within Los Carneros Water District's jurisdictional boundary would be compounded and agricultural production would likely be subject to significant losses.
6. The Los Carneros Water District does not own, lease, or operate any facilities relating to the collection and treatment of wastewater, a prerequisite for producing reclaimed water. As a result, the District's ability to develop reclaimed water service is dependent upon importing supplies from an outside provider.

7. The development of reclaimed water service within Los Carneros Water District's jurisdictional boundary offers the promise of lessening the demand for creek diversions and groundwater withdrawals, and promotes the beneficial use of recycled water for agricultural use.

Growth and Population Projections:

1. The Los Carneros Water District is under the land use authority of the County of Napa. Land located within the District is zoned "Agricultural Watershed" and "Agricultural Watershed – Airport Compatibility." These zoning standards essentially prohibit future residential and commercial development within the District by requiring minimum parcels sizes of at least 160 acres.
2. There are approximately 28 parcels located within the Los Carneros Water District's jurisdictional boundary under "Williamson Act" contracts with the County of Napa. These parcels represent approximately 40 percent of the entire jurisdictional boundary and help to ensure the preservation of agriculture and open space as predominant land uses within the District.

Parcels under Williamson Act contracts are required to maintain their agricultural and open space land uses over the course of renewable 10-year periods in exchange for reduced property tax assessments.

3. The development of reclaimed water service within Los Carneros Water District's jurisdictional boundary would not induce growth beyond what is already contemplated by the land use plans adopted by the County of Napa.

Financing Constraints and Opportunities:

1. Under its agreement with the Napa Sanitation District, the Los Carneros Water District is not responsible for costs relating to the construction or operation of facilities involved in the delivery of reclaimed water service within its jurisdictional boundary. This agreement (if realized) implies that the Napa Sanitation District will pursue future financing opportunities as it relates to reclaimed water service for the District through a surrogate role.

This agreement remains valid until mutually terminated or upon written notice by the Napa Sanitation District that it no longer intends to serve the District.

2. The Los Carneros Water District is empowered under the California Water Code to generate revenue through assessments, bonds, and water use and standby charges. The District has elected not to pursue the development of revenue streams or cash reserves due to its agreement with the Napa Sanitation District that specifies it is not responsible for costs relating to the construction or operation of facilities involved in the delivery of reclaimed water service within its jurisdictional boundary. Accordingly, the District is not capable of issuing

mailings, financing studies, or contracting with outside agents to evaluate alternative service or financing opportunities.

3. In 2002, California voters approved Proposition 50. This proposition authorizes the sale of \$3.44 billion dollars in general obligation bonds to help government agencies to develop and enhance local water resources and related infrastructure systems through grant financing programs. Although funding is expected to be competitive, this proposition provides an opportunity for the Los Carneros Water District to secure financing for a reclaimed water delivery system if it determines that its agreement with the Napa Sanitation District is no longer viable. The District should contact the Department of Water Resources to begin exploring funding opportunities under this proposition.

Cost Avoidance Opportunities:

1. The Los Carneros Water District's agreement with the Napa Sanitation District all but eliminates costs for the District with respect to the delivery of reclaimed water service to its constituents. Notable cost-savings associated with this agreement includes providing the District unconfined access to a wide range of administrative and operational support, including engineering and maintenance personnel.

Opportunities for Rate Restructuring:

1. The Los Carneros Water District does not have an adopted rate schedule for reclaimed water service. Under its agreement with the Napa Sanitation District, the District conveys all rights and powers relating to establishing reclaimed water rates within its jurisdictional boundary.

Opportunities for Shared Facilities:

1. Through its contractual relationship with the Napa Sanitation District, the Los Carneros Water District may benefit from collaborative reclamation projects under evaluation by the North Bay Watershed Association: a stewardship program comprised of public water and wastewater agencies in Sonoma, Marin, and Napa Counties. The organization is currently evaluating the feasibility of bringing together several water and wastewater agencies in the North Bay for the purpose of constructing a jointly-operated reclaimed water delivery system for beneficial uses throughout the San Pablo Bay watershed. Notably, this project may provide an opportunity for the Napa Sanitation District to share costs with other agencies towards the construction of facilities for the delivery of reclaimed water to the District as part of a larger collaborative reclamation project.

Government Structure Options:

1. The Los Carneros Water District is empowered under the California Water District Act to provide three municipal services: water, sewer, and hydroelectric power. Due to its agricultural land use designation under the County of Napa's General Plan, the District does not require a full range of municipal services. Only water for irrigation of agriculture is an appropriate and needed service within the District.
2. The Los Carneros Water District has been successful in meeting its original objective to facilitate an agreement with the Napa Sanitation District for the delivery of reclaimed water on behalf of landowners within its jurisdictional boundary. Through this agreement, the District provides a safeguard for the Napa Sanitation District with respect to developing its planned reclamation project for the Carneros area. Although it has not been developed, Napa Sanitation District's planned project remains a viable solution to meeting the District's needs to secure reclaimed water service on behalf of local landowners within the timeframe of this study.
3. It is unknown if there are advantages to pursuing a change in reorganization for the Los Carneros Water District due to the limited information concerning alternative government structures and any cost-benefits with respect to meeting the service needs of the affected area. Additional information is needed to determine whether an alternative government structure would better serve the needs of the District's constituents as it relates to improving delivery service, public participation, and local accountability.
4. There are two other public agencies empowered to provide water service for agricultural use whose jurisdictions overlap that of the Los Carneros Water District: the Napa County Flood Control and Water Conservation District and Napa County Resource Conservation District. Both of these agencies have elected not to offer water service, and have expressed no intentions of doing so in the foreseeable future.
5. There are three public agencies with service areas in reasonable proximity to the Los Carneros Water District that produce reclaimed water supplies: the Napa River Reclamation District No. 2109, Napa Sanitation District, and the Sonoma County Water Agency. Of these three agencies, only the Napa Sanitation District is readily capable of extending service to the District based on its available capacity and supply of tertiary-treated wastewater.

The Napa River Reclamation District No. 2109 produces only 10-12 acre-feet of tertiary-level treated wastewater per year, while the Sonoma County Water Agency provides only secondary-level treated wastewater within the Carneros region of Sonoma County. In addition to these operating constraints, both agencies have expressed no interest in expanding service to the District.

6. Due to a limited number of alternative service providers, the Napa Sanitation District offers the best opportunity for providing reclaimed water supplies to the Los Carneros Water District.

Evaluation of Management Efficiencies:

1. Los Carneros Water District has an agreement with the Napa Sanitation District that has deterred its board members from being proactive with respect to exploring alternative service options. The District should establish a timetable requiring it to determine whether its agreement with the Napa Sanitation District is still viable, and if not, begin to evaluate alternative service options. This timetable should conclude prior to LAFCO's next review of the District.
2. The Los Carneros Water District should convene a public meeting to evaluate support among its constituents with respect to executing individual service agreements for reclaimed water service with the Napa Sanitation District. Upon determining the intent of its constituents, the District should convey its findings to the Napa Sanitation District. This information will help the Napa Sanitation District make an informed decision as to whether there is sufficient commitment among local property owners before committing its ratepayers to the costs of implementing its planned reclamation project for the area.

Local Accountability and Governance:

1. The Los Carneros Water District's governing body is comprised of four volunteer directors who are all serving expired terms. These board members have been reappointed in lieu of other candidates seeking election. The lack of willing participation among constituents to serve on the District's governing board has contributed to its complacency towards galvanizing support for executing individual service agreements with the Napa Sanitation District and exploring alternative service options.
2. The Los Carneros Water District should appoint a fifth director to continue its established practice of maintaining a five-member board of directors. The appointment of a fifth director will help to ensure a quorum and strengthen the Board's accountability to the public.
3. To enhance its public outreach efforts, the Los Carneros Water District should begin to recruit and acquaint new board member candidates with respect to local service goals and objectives in anticipation of future board member departures. These efforts will help to ensure a viable pool of successor candidates, and provide an opportunity to cultivate new perspectives and approaches that may prove successful in meeting the service needs of the District.

4. The Los Carneros Water District has not conducted a regularly scheduled board meeting for several years. To ensure compliance with its enabling act, while enhancing community input, the District should adopt an annual calendar specifying dates, times, and locations for future board meetings with written notices made available to all local property owners.

California Water Code §34802 requires board members hold regular meetings at such time and place as agreed upon by resolution.

5. The Los Carneros Water District and its constituents would benefit from regularly scheduled board meetings at fixed times and locations. Notably, this would enhance the District's local accountability by providing an opportunity for its constituents to ask questions of their elected representatives, while helping to ensure that information is being effectively communicated to the public in a timely and efficient manner.
6. To ensure its compliance with the Ralph M. Brown Act, the Los Carneros Water District must ensure that their deliberations are conducted in an open and transparent manner. These efforts will strengthen the District's accountability, and help to facilitate public participation in its decision making process.
7. The Los Carneros Water District must improve its public dialogue to help ensure that other agencies in Napa County are aware of its activities and plans. At a minimum, this should include fulfilling its administrative duties relating to filling all required documentation with the State of California and the County of Napa, and provide LAFCO with annual progress reports with respect to developing reclaimed water service.
8. The Los Carneros Water District should work with the County of Napa, Napa Sanitation District, and LAFCO to evaluate whether there are better alternatives to its current government structure. This evaluation should be facilitated by LAFCO and based on local landowners needs in relation to designated land uses and service capabilities of the Napa Sanitation District. These efforts will help address the question of how best to deliver reclaimed water to the District within a reasonable timeframe, while strengthening its long-term accountability to the public.